SEMESTER EXAMINATION, DECEMBER-2025

Course Name:-MBA Semester: - First

Paper Name:- Quantitative Techniques for Research Paper Code:- FO10706T

Time - 3 Hrs + 20 minutes per hour extra time for V.I. & examinees with writer. Max Marks-75

Instructions:

- The question paper consists of three sections namely A, B, C. All sections are compulsory.
- Section A- Each question carries **01** marks. All questions are compulsory.
- Section B- Answer any **4 out of 6** given questions. Each question carries **07 marks**.
- Section C- Answer any **2 out of 3** given questions. Each question carries **16 marks**.

Section – A
Objective Questions

1. All questions are compulsory. 1×15=15

a) Multiple choice Questions.

i) Minimum value of a correlation coefficient (like Pearson's *r*) is……..

a) -2 b) 1
c) 0 d) -1

ii) When coefficient of Skewness is zero the distribution is……

a) J-shaped b) W-shaped
c) Symmetrical d) L-shaped

iii) What is the median of 36, 72, 49, 45, 60, 33, 61, 72, 52 ?

a) 33 b) 52
c) 61 d) 60

Arithmetic

iv) The geometric mean of 8, 64, and 510 is……

a) 194 b) 64
c) 16 d) 136

v) Regression analysis is a measure of……

a) Degree and direction of relationship b) Degree of association
c) Cause and effect relationship d) None of these

b) True or False

i) If a boy cycles 8 km at the speed of 8 km per hour, and walks another 8 km at the speed of 2 km per hour. His average speed per hour is 5 km.

ii) The t-test is a Non-parametric test.

iii) Quota sampling is a type of non-probability sampling.

iv) Annual reports of companies are secondary data.

v) Relation between two variables is determined by mean.

c) Fill In The Blanks.

i) The standard deviation of 3, 3, 3, 5, 5, 5 is_____

ii) Suppose the average weight of 9 persons is 50 kg. Average weight of the first 5 persons is 45 kg. , whereas average weight of the last 5 persons is 55 kg. Then the weight of the 5th member will be_____

iii) Questionnaire help us in collecting _____data.

iv) Chi-square test is a fundamental tool in _____testing.

v) A _____is any portion drawn from a population.

Section – B
Short Answer Questions

2. Answer any four of the following questions. 7×4=28

1) Define statistics. Discuss its main functions.

2) In a sample study about coffee habits in two towns, the following information was received:

Town A: Females were 40%, Total coffee drinkers were 45% and Male non-coffee drinkers were 20%

Town B: Males were 55%, Male non-coffee drinkers were 30% and Female coffee drinkers were 15%.

Represent this data in a tabular form.

3) Define Median. Point out the merits and demerits of median.

4) Calculate standard deviation of the following marks obtained by 10 students in a tutorial group:

Marks obtained: 8, 12, 13, 15, 22, 30, 31, 54, 74, 89

5) What do you understand by a normal distribution curve?

6) What is meant by correlation analysis?

Section – C
Descriptive Questions

3. Answer any two of the following questions. 16×2=32

1) What is skewness? Explain the difference between dispersion and skewness.

2) Draw a scatter diagram for the following data:

X:	9	11	13	12	10	8	14	16	18
Y:	6	8	10	9	7	5	11	13	15

3) Write an essay on Non-parametric statistical tests.

As a part of thi
thinksheets fi